

What Is Claimed Is:

1. A pneumatic tire comprising a tread portion divided into blocks by tread grooves, said blocks being provided with a plurality of sipes, each of said sipes opened at a tread face and having a zigzag part, wherein:

a tread rubber of the tread portion is formed of short fiber mixed rubber comprising 1.5 to 25 parts by weight of short fibers in 100 parts by weight of rubber component,

said sipes comprise a three dimensional sipe in which each wall surface forms bumps and dips whereby said short fibers are three dimensionally arranged,

said three dimensional sipe comprises the zigzag part extending from the tread face to a certain depth, while (1) gradually moving towards a direction and then the opposite direction thereto or (2) changing the length of the segments of the zigzag of the zigzag part.

2. The pneumatic tire according to claim 1, wherein said direction is parallel with the center line of the zigzag.

3. The pneumatic tire according to claim 1, wherein said direction is crosswise to the center line of the zigzag.

4. The pneumatic tire according to any of claims 1 to 3, wherein a distance between the center lines of the zigzag part

of the adjacent three dimensional sipes is 2.5 to 10.0mm.

5. The pneumatic tire according to any of claims 1 to 4, wherein a zigzag amplitude W of the zigzag part is 1 to 5mm, and a zigzag pitch Y of the zigzag part is 0.6 to 10.0 times the zigzag amplitude W.

6. A pneumatic tire according to any of claims 1 to 3, wherein the zigzag part extends from the tread face to a certain depth, while gradually moving towards a direction and then the opposite direction to said direction by a displacement amount La whereby the wall surface of the zigzag part is made up of parallelograms.

7. The pneumatic tire according to claim 6, wherein said parallelograms are equal to each other.

8. The pneumatic tire according to claim 6, wherein said displacement amount La is 0.3 to 4.0mm.

9. A producing method of the pneumatic tire according to any one of claims 1 to 8, wherein siping blades each having a shape corresponding to the three dimensional sipe are projected from an inner surface of a curing mold, tread rubber of a raw tire is pushed between the siping blades, thereby orienting

short fibers in the tread rubber three dimensionally.